



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/692,998	10/24/2003	Graham Davis	TOMK0002	9351
25235	7590	05/18/2004	EXAMINER	
HOGAN & HARTSON LLP ONE TABOR CENTER, SUITE 1500 1200 SEVENTEENTH ST DENVER, CO 80202			WRIGHT, ANDREW D	
			ART UNIT	PAPER NUMBER
			3617	

DATE MAILED: 05/18/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

10/692,998

Applicant(s)

DAVIS, GRAHAM

Examiner

Andrew Wright

Art Unit

3617

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-22 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☒ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_.

## **DETAILED ACTION**

### ***Priority***

1. Acknowledgment is made of applicant's claim for foreign priority based on an application filed in United Kingdom on 04/27/2001. It is noted, however, that applicant has not filed a certified copy of the UK application as required by 35 U.S.C. 119(b). It is further noted that applicant has not provided a copy of the PCT application to which the current application claims benefit under 35 USC 120. Applicant must submit both to receive the benefit of the earlier filing date.

### ***Claim Objections***

2. The numbering of claims is not in accordance with 37 CFR 1.126 which requires the original numbering of the claims to be preserved throughout the prosecution. When claims are canceled, the remaining claims must not be renumbered. When new claims are presented, they must be numbered consecutively beginning with the number next following the highest numbered claims previously presented (whether entered or not). In the instant application, claim number 22 has been skipped. Accordingly, claim 23 has been renumbered claim 22 and will be referred to as such throughout prosecution.
3. Claim 4 is objected to. In line 1, the word "one" should be inserted after "at least".
4. Claim 9 is objected to. The recitation "the keel" lacks antecedent basis in the claims. A positive recitation will be assumed for examination.

5. Claim 14 is objected to. The recitation "the main hull" lacks antecedent basis in the claims. A positive recitation will be assumed for examination.
6. Claim 18 is objected to. The recitation "the aft end" lacks antecedent basis in the claims. A positive recitation will be assumed for examination. Also, the word "member" should be inserted after extension in line 1.
7. Claim 19 is objected to. The recitation "the hull" lacks antecedent basis in the claims. A positive recitation will be assumed for examination.
8. Claim 21 is objected to. The words "the or" in line one appear to be typographical errors. Also, the recitation "the propeller" lacks antecedent basis in the claims. A positive recitation will be assumed for examination.
9. Claim 22 is objected to. The recitation "the tunnels" lacks antecedent basis in the claims. Claim 22 will be assumed to depend from claim 20 where the pair of tunnels is recited.

***Claim Rejections - 35 USC § 102***

10. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

11. Claims 1-3, 5-7, 11, 12, 15, and 19-21 are rejected under 35 U.S.C. 102(b) as being anticipated by Abel (US 5,315,950). Abel discloses an amphibious vehicle (10) with a sponson (20).
12. Regarding claim 2, the sponson is moveable between stowed and deployed.

13. Regarding claim 3, the sponson is moves with respect to the hull.
14. Regarding claim 5, the sponson is flush with the top of the hull when stowed.
15. Regarding claim 6, the sponson is always parallel to the hull.
16. Regarding claim 7, the sponson is mounted by a linkage of pivoted arms.
17. Regarding claim 8, the arms form part of a parallelogram.
18. Regarding claim 11, there are two sponsons, one on each side.
19. Regarding claim 12 there are fore and aft wheels. The sponson is stowed in an area between the wheels.
20. Regarding claim 15, the vehicle can carry passengers.
21. Regarding claim 19, the vehicle has a propeller tunnel (60).
22. Regarding claim 20, the vehicle has a pair of propeller tunnels.
23. Regarding claim 21, each tunnel has a length that constitutes a depth dimension that is greater then one half the diameter of the propeller in the tunnel.
  
24. Claims 1 and 16-18 are rejected under 35 U.S.C. 102(b) as being anticipated by Gail (US 4,048,685). Gail discloses an amphibious vehicle (10) with a sponson (13). The vehicle has another sponson (14) that constitutes the transom extension member. The transom extension member (14) is movable between stowed and deployed positions (figures 4 and 5). The transom extension member increases the waterline by at least 5% when deployed (figures 4 and 5). The transom extension member (14) is parallel with the waterline when deployed. And a portion of it stows flat against the aft end of the vehicle.

25. Claims 1-3, 7, and 9 are rejected under 35 U.S.C. 102(b) as being anticipated by Engler (US 5,687,669). Amphibious vehicle (20) has sponson (200). Sponson is moveable with respect to the hull between stowed and deployed positions. Sponson is mounted by pivoted linkage arms (404, 408). Sponson raises with respect to the keel when moved from stowed to deployed.

26. Claims 1-4 are rejected under 35 U.S.C. 102(b) as being anticipated by Wagner et al. (US 3,661,114). Amphibious vehicle (1) has sponson (15). Sponson is moveable with respect to the hull between stowed and deployed positions. Sponson is mounted by pivoted linkage arms (13, 14, 42). Sponson (15) is spaced more than half a hull width from the main hull (figure 7).

27. Claims 1, 13, and 14 are rejected under 35 U.S.C. 102(b) as being anticipated by Cook et al. (US 1,490,964). Cook discloses an amphibious vehicle (1) with sponson (22). Vehicle has road wheels (30) that can be stowed in the pontoon or deployed for road use. The ride height is automatically adjusted in between positions by spring (32). The wheels are pivotally mounted on arm (29).

28. Claims 1-3, 7, 9, and 10 are rejected under 35 U.S.C. 102(b) as being anticipated by Votre (US 3,027,862). Amphibious vehicle (10) has sponson (20) which is moveable with respect to the vehicle between stowed and deployed positions. Sponson is attached to pivoted linkage arms (52, 20b). Sponson moves upward with respect to

keel through a portion of the arc when moving between stowed and deployed. Sponson moves in an aft direction through a portion of the arc when moving from stowed to deployed.

***Claim Rejections - 35 USC § 103***

29. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

30. Claim 22 is rejected under 35 U.S.C. 103(a) as being unpatentable over Abel (US 5,315,950) in view of Bellezza Quarter et al. (US 6,116,972). Abel discloses all of claim 22 except for the flow direction flaps. Bellezza Quarter discloses an amphibious vehicle with propeller tunnels. Pivoted flaps (229) are provided at the ends of the tunnels. The flaps provide protection in one position and deflection in another. Therefore it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Able by using pivoted flaps as taught by Bellezza Quarter. The motivation would be to provide protection and deflection capability as well as full flow capability.


**Conclusion**

31. Any inquiry concerning this communication should be directed to examiner Andrew D. Wright at telephone number (703) 308-6841. The examiner can normally be reached Monday-Friday from 9:00 - 5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, S. Joe Morano, can be reached at (703) 308-0230. The fax number for official communications is 703-872-9306. The fax number directly to the examiner for unofficial communications is 703-746-3548.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist at (703) 308-1113.

Andrew D. Wright  
Patent Examiner  
Art Unit 3617

 5/12/04